

Connecting Data Through Mission

Department of Transportation (DOT)



### TABLE OF CONTENTS

## U.S. Department of Transportation (DOT)

- Transportation Mission Overview
- Connecting Data through Community Connections
- Results
- Lessons Learned
- Appendix

## A National Transportation System

Across highway, rail, maritime, and sky, the U.S. Department of Transportation (DOT) is providing an efficient, accessible, and safe national transportation system



#### DOT'S MISSION

Serve the United States by ensuring a fast, safe, efficient, accessible and convenient transportation system that meets our vital national interests and enhances the quality of life of the American people, today and into the future.









#### **Key Objectives**

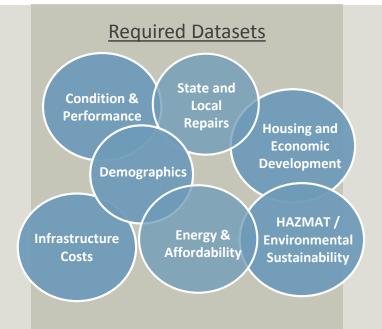
- Safety Improve public health and safety by reducing transportation-related fatalities and injuries.
- **State of Good Repair** Ensure the U.S. proactively maintains critical transportation infrastructure in a state of good repair.
- **Economic Competitiveness** Promote transportation policies and investments that bring lasting and equitable economic benefits to the Nation and its citizens.
- Livable Communities Foster livable communities by integrating transportation policies, plans, and investments with coordinated housing and economic development policies to increase transportation choices and access to transportation services for all users.
- **Environmental Sustainability** Advance environmentally sustainable policies and investments that reduce carbon and other harmful emissions from transportation sources.

## From Mission to Community

DOT faces intrinsic data challenges as it collects data from across local, State, and Federal agencies to fulfill its mission

#### **DOT Mission**

- Safety
- State of Good Repair
- **Economic** Competitiveness
- **Livable Communities**
- Environmental Sustainability



#### **Key Challenges**

- Data dispersed across Federal, State, and Local agencies
- Unstructured and structured data formats
- Inconsistent Standards
- Complimentary datasets across many agencies

To address these key challenges, DOT implemented a focused strategy of community and consensus building across government

**Focusing** around a common mission

**Engaging the safety** community and building consensus

Establishing a platform for inter-agency dialogue

## Addressing All Three Openness Principles

DOT recognized that transparency is necessary but an insufficient condition for achieving the greatest value from safety data

#### **MORE THAN JUST DATA**

While DOT and other Federal agencies collect important safety-related data, releasing data alone does not fully leverage the potential of those datasets for discovering new information, inventing new products, or identifying complex patterns to improve decision making.

#### Open Government Principles

as identified in the President's National Action Plan for Open Government



#### **Transparency**

Promoting accountability by providing the public with information about enforcement and compliance actions the government is taking, as well as raw data underlying metrics used to track safety performance

#### Collaboration

Stimulating the use of safety data at all levels of government, especially at the State and local levels

#### **Participation**

Enabling participation from members of the public to contribute ideas and expertise, suggesting datasets to be provided or highlighting applications and models that promote the use of safety data

## Partnering with the Community

DOT engaged with multiple agencies, the public, and any interested parties who could contribute innovative ideas and data for the safety initiative

#### THE SAFETY COMMUNITY

Agencies and partners with a shared safety mission and data

#### **ENGAGEMENT**

Opportunities, platforms, and products to engage the community



**Department of Transportation** 



**Federal Emergency and Management Agency** 



**DATA.GOV** 

Safety.Data.Gov

Webinars & Conferences



**Department of** Labor



**Department of** Justice



Centralizing engagement and sharing best practices



Census Bureau



**US Consumer Product Safety Commission** 



Datapaloozas, Data Jams, & Hackathons



**U.S.** Department of Agriculture



**Department of Health** and Human Services









**Data Apps and** Challenges

## Integrating Data Through Community Connection

Promoting data integration and metadata standards through customer engagement and community operations

#### - WORKING AS ONE -

### Organization

- Centralize safety related datasets
- Tag datasets to collectively unify data around safety
- Allocate resources and energy voluntarily based on need and interest

### Engagement

- Engage the public on a unified front around safety and innovation
- Leverage best practices to advance agencyspecific data releases

### Dialogue

- Create a platform for inter-agency dialogue through regular discussion and sharing
- Promote flexibility and agility by lessening the formality of the community interaction

### **Safety Data and Community**

## Inter-agency Community Enabled Open Innovation

Forming a community around a central theme stimulated public engagement and accelerated modernization of open data preparation and distribution



### Lessons Learned

"Mission Led, IT Enabled" has been DOT's principle theme in their open data approach while maintaining an open conduit for public and private industry engagement



- Connecting through mission has enabled the Safety Community's ability to quickly organize and sustain full and voluntary engagement.
- The Safety Community has an established culture that inherently drives volunteerism and passion around transparency balanced with privacy and security.
- Creating a common lexicon and taxonomy is less important now than ever before. Use big data and semantic technologies to help *prioritize your time on data transparency not data definitions*.
- You don't necessarily always have to be innovative with your data; partnerships with agencies and industry drive innovation and idea incubation.
- Centralizing datasets, such as Data.gov, provides a solid foundation for further innovation. The shared, centralized platform of Data.gov has been essential to this rapid development process.

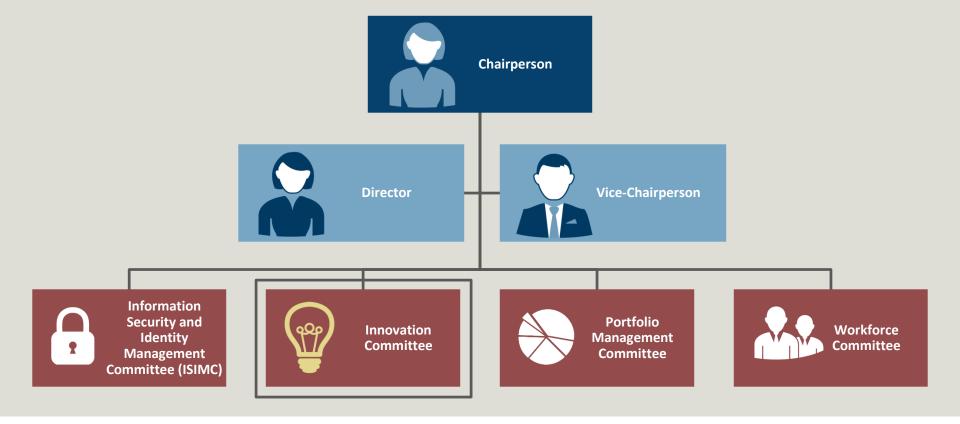
# **Appendix**

### The Federal CIO Council

The Federal CIO Council is the principal interagency forum on Federal agency practices for IT management



The Federal CIO Council mission is to improve practices related to the design, acquisition, development, modernization, use, sharing, and performance of Federal Government information resources.



### The Innovation Committee

The Federal CIO Council created the Innovation Committee to enable Agency mission delivery, improve customer service, maximize return-on-investment, and support emerging IT needs



Chaired by Margie Graves (DHS Deputy CIO) and Bill Zielinski (SSA) CIO), the Innovation Committee focuses on relevant topics such as the use of modern technologies to deliver digital services to citizens and businesses, deployment of mobile technology within Government, modular IT development strategies, and using Federal data as a strategic resource to enable Agency mission delivery and to grow the economy.



For more information on the Federal CIO Council, the Innovation Committee, or products and resources, visit www.ClO.gov.